

I possess the following examples of *E. rotundata*. One male and one female from Beeling, Upper Burma, taken on 27th March, 1886, two males on the 29th idem, one female on the 14th April, by Lieut. E. Y. Watson; two males taken in the Pegu Yoma, Burma, by a native collector employed by the Phayre Museum, Rangoon, in December; one female from Quaymoo, Tenasserim, captured in March and another in November, in the Yoonzaleen Valley, also in Tenasserim by Major C. T. Bingham.

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*Two species of Pedicularis.*—By D. PRAIN.

(With Plates I and II.)

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In 1889 (*Journ. As. Soc. Beng.* lviii pt. 2, p. 255) the writer had the honour to communicate to the Society descriptions of a number of new Indian species of this genus. Since then a considerable number of new species have been reported from China and Tibet and have been described in various periodicals by Messrs Maximowic, Hemsley and Franchet, and by the writer. Now, another new Indian species has been reported; of this a description is given below and the present opportunity is taken of describing an allied new species from Szechuen.

1. PEDICULARIS DIFFUSA Prain, *sp. nov.* (PL. I.)

*Elata simplex vel e collo diffuse ramosa, radice debili ramosa collo esquamato, caulibus gracilibus simplicibus, foliis radicalibus longe petiolatis mox evanescentibus caulinis 4-natis verticillatis laminis glabrescentibus ovato-oblongis pinnatisectis, segmentis 5-8-jugis oblongis obtusis inciso-serratis; floribus verticillatis verticillis numerosis inter se remotis, bracteis foliaceis oblongo-ovatis petiolatis pinnatifidis et inciso-serratis; calycis breve pedicellati campanulati membranacei inflati totius reticulati antice vix fissi dentibus majusculis inaequilatis anticis et lateralibus ovatis inciso-serratis illis duplo his 4-plo summo deltoideo integro latioribus; corollae roseae tubo sursum ampliato calyce duplo longiore basi infracto, labio 3-lobo lobis oblongo-ovatis margine sinuatis lateralibus medio dimidio majoribus, galea leviter arcuata tubo subcontinua apice subincurva erostri; staminibus ex adverso summi ovarii insertis filamentis anticis superne hirsutis; ovario ovoideo stigmate parum exserto, capsula anguste lanceolata apice acuta calyce duplo longiore, seminibus ovoideis testa nigrescente minute reticulatis.*

In HIMALAYA ORIENTALI: Sikkim, Mt. Tankra, 11,500 p. s. m.; *G. A. Gammie!*

Caulibus 40–60 cm. longis, foliis caulinis 2–2.5 cm. longis his 0.75–1 cm. latis, segmentis 5 mm. longis 3 mm. latis, petiolis 0.5–1 cm. longis; calyce 6 mm. longo hoc 3.5 mm. lato; corollae tubo 10 mm. longo apice 4 mm. lato, galea 5 mm. longa, labio 8 mm. lato; capsula 12 mm. longa 5 mm. lata.

This species is most nearly related to *P. verticillata* Linn. and *P. refracta* Maxim. but besides differing greatly in habit and foliage from both it differs from *P. verticillata* in having a calyx with large teeth and with a tube reticulated throughout, while it differs from *P. refracta* in having the anterior and lateral calyx teeth serrate and not entire; from both it differs in having acute, not mucicous, anther-cells.

Of Indian species, it in habit much resembles *P. flexuosa* Hook. f., though it is glabrescent while that species is hirsute, but the plant that it imitates most closely is *P. gracilis* Wall. var. *macrocarpa* Prain, the likeness being so great that though in flower they differ so widely, it is not easy to distinguish fruiting specimens of the two.

## 2. PEDICULARIS FLACCIDA Prain; *sp. nov.* (Pl. II.).

Ascendens glabra caulibus gracilibus corymbosim ramosis, foliis ramisque 3–4-natis verticillatis radicalibus mox evanescentibus caulinis breve petiolatis ovatis pinnatifidis segmentis 5–6-jugis obtusis inciso-serratis; floribus in verticillis 4-floris paucis remotisque dispositis, bracteis foliaceis calycem excedentibus; calycis glaberrimi parvuli campanulati antice parum fissi 5-dentati segmentis omnibus oblongis integris tubo costato nec reticulato; corollae tubo sursum ampliato calycem 3-plo excedente basi infraeto, labio 3-lobo lobis lateralibus ovatis medio orbiculato basi constricto 3-plo majoribus, galea leviter arcuata tubo subcontinua apice subincurva erostri, staminibus ex adverso medii ovarii insertis omnibus glabris, antheris contiguis mucicis; ovario ovoideo stigmate exserto.

In CHINA OCCIDENTALI; Szechuen occident. prope Tachienlu, *Pratt* n. 471!

Caulibus 20–25 cm. longis foliis caulinis 1 cm. longis his 0.7 cm. latis segmentis 2 mm. longis 1 mm. latis, petiolis 0.5 cm. longis; calyce 2.5 mm. longo hoc 2 mm. lato; corollae tubo 8 mm. longo apice 4.5 mm. lato, galea 4 mm. longa, labio 7 mm. lato.

Like the preceding species this is also closely related to *P. verticillata* Linn. but differs considerably in habit, and though it has the calyx tube ribbed and not reticulated just as *P. verticillata* has, it differs in having the calyx distinctly toothed and extremely small. The stamens also differ in being all glabrous whereas in *P. verticillata* the anterior

pair are hirsute ; the anthers though mucous as in *P. verticillata* are contiguous and not discrete. The fruit is unknown.

As both these species belong to one natural group it may be useful to provide a key, modified, so as to admit of their reception, from the key already published by the writer (*Ann. Roy. Bot. Garden, Calcutta*, iii, 94), in which the relative position of these and of the previously known species is shown.

VERTICILLATAE.

Galea less than half the length of the lip :—

Bracts flabellate, spike long, dense ; calyx  
small, subglobose, not cleft, teeth small,

entire : anterior filaments hairy ... *P. spicata.*

Substitute for pages 9, 10, 15 and 16, in No. 1 of  
Pt. II., Journal for 1893.

Calyx distinctly cleft, teeth entire :—

Margin of galea even ; anterior fila-  
ments hairy ... .. *P. refracta.*

Margin of galea toothed ; filaments  
not hairy ... .. *P. szetschuanica.*

Explanation of the Plates.

PLATE I. *Pedicularis diffusa* Prain.

1, Flower with bract ; 2, calyx with ovary and style ; 3, half of corolla showing staminal insertion ; 4, stamens ; 5, capsule ; 6 seed : 1, 2, 3 and 5 magnified  $\frac{2}{3}$  ; 4 and 6 magnified  $\frac{1}{4}$ .

PLATE II. *Pedicularis flaccida* Prain.

1, Flower with bract ; 2, calyx with ovary and style ; 3, half of corolla showing staminal insertion : all magnified  $\frac{2}{3}$ .